IN THE CLAIMS

Please amend the claims as follows:

Claim 1 (Currently Amended): A hub unit having a sensor, comprising:

a hub unit having a wheel-side raceway member for a wheel connectable thereto;

a body-side raceway member to be attached to a vehicle body and two rows of rolling bodies arranged between the two raceway members; and

a sensor device provided on the hub unit, the body-side raceway member having a cylindrical portion and a flange portion provided with an insertion hole for a bolt for fastening the hub unit to the vehicle body,

the hub unit having a sensor being characterized in that the sensor device has a sensor ~~provided at a location between the outer peripheral part of the cylindrical portion of the body-side raceway member and the inside of the flange portion thereof~~ affixed to the curved base end part of the flange portion for detecting the amount of deformation of the location and processing means for determining a ground contact load from the output of the sensor.

Claim 2 (Canceled).

Claim 3 (Currently Amended): A hub unit having a sensor, comprising:

a hub unit having a wheel-side raceway member for a wheel connectable thereto;

a body-side raceway member to be attached to a vehicle body and two rows of rolling bodies arranged between the two raceway members; and

a sensor device provided on the hub unit, the body-side raceway member having a cylindrical portion and a flange portion provided with an insertion hole for a bolt for fastening the hub unit to the vehicle body,

the hub unit having a sensor being characterized in that the sensor device has a sensor for detecting the amount of deformation of the flange portion of the body-side raceway member and processing means for determining a ground contact load from the output of the sensor,

wherein the sensor is a displacement sensor supported by a support member ~~fixed to~~ that extends axially from one of the cylindrical portion of the body-side raceway member and the flange portion thereof for detecting the distance between the displacement sensor and the other portion.

Claim 4 (Original): A hub unit having a sensor according to claim 3 wherein the displacement sensor is a magnetic sensor provided on a forward end of the support member for detecting variations in the distance from the displacement sensor to an outer periphery of the cylindrical portion of the body-side raceway member, and a magnetized portion is provided on the other portion of the body-side raceway member which portion is not provided with the support member, at a location opposed to the sensor.

Claim 5 (Original): A hub unit having a sensor according to claim 3 wherein the displacement sensor is a displacement sensor of the inductance type provided on a forward end of the support member for detecting variations in the distance from the displacement sensor to the other portion of the body-side raceway member which portion is not provided with the support member.

Claim 6 (Previously Presented): A hub unit having a sensor according to claim 1 wherein the sensor is provided at a curved boundary surface between the outer peripheral part

of the cylindrical portion of the body-side raceway member and the inside of the flange portion thereof.

Claim 7 (Currently Amended): A hub unit having a sensor according to claim ~~2~~ 1 wherein the curved boundary surface is consecutive toward the inside of the flange portion of the body-side raceway member.

Claim 8 (Previously Presented): A hub unit having a sensor according to claim 1 wherein the sensor is affixed to the location with an adhesive.

Claim 9 (Previously Presented): A hub unit having a sensor according to claim 2 wherein the sensor is affixed to the curved boundary surface with an adhesive.

Claim 10 (New): A hub unit having a sensor, comprising:

a hub unit having a wheel-side raceway member for a wheel connectable thereto;

a body-side raceway member to be attached to a vehicle body and two rows of rolling bodies arranged between the two raceway members; and

a sensor device provided on the hub unit, the body-side raceway member having a cylindrical portion and a flange portion provided with an insertion hole for a bolt for fastening the hub unit to the vehicle body,

the hub unit having a sensor being characterized in that the sensor device has a sensor for detecting the amount of deformation of the flange portion of the body-side raceway member and processing means for determining a ground contact load from the output of the sensor,

wherein the sensor is a displacement sensor supported by a support member that extends radially from the cylindrical portion of the body-side raceway member for detecting the distance between the displacement sensor and the other portion.